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EXAMINER	
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Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Office Action Summary	Application No.	Applicant(s)	
	10/567,761	MORI ET AL.	
	Examiner	Art Unit	
	Ponder N. Thompson-Rummel	1795	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE *3* MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

1)☒ Responsive to communication(s) filed on *27 September 2007*.

2a)☐ This action is **FINAL**. 2b)☒ This action is non-final.

3)☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

4)☒ Claim(s) *1-24* is/are pending in the application.

4a) Of the above claim(s) _____ is/are withdrawn from consideration.

5)☐ Claim(s) _____ is/are allowed.

6)☒ Claim(s) *1-24* is/are rejected.

7)☐ Claim(s) _____ is/are objected to.

8)☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

9)☐ The specification is objected to by the Examiner.

10)☒ The drawing(s) filed on *2/10/2006* is/are: a)☒ accepted or b)☐ objected to by the Examiner.

Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).

Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).

11)☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

12)☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).

a)☒ All b)☐ Some * c)☐ None of:

1.☒ Certified copies of the priority documents have been received.

2.☐ Certified copies of the priority documents have been received in Application No. _____.

3.☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

1) ☒ Notice of References Cited (PTO-892)
2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
3) ☒ Information Disclosure Statement(s) (PTO/SB/08) Paper No(s)/Mail Date *10/3/2007*.
4) ☐ Interview Summary (PTO-413) Paper No(s)/Mail Date. _____.
5) ☐ Notice of Informal Patent Application
6) ☐ Other: _____.

Claim Rejections - 35 USC § 103

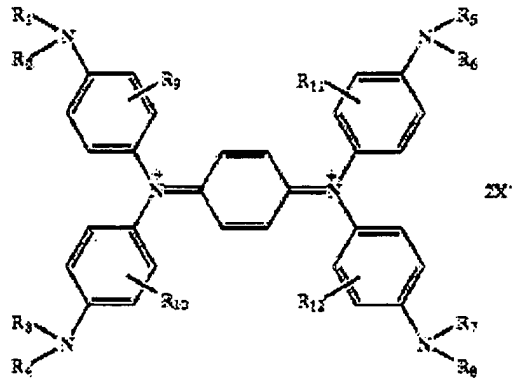
1. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

> (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

2. Claims 1,2, 4 and 13 are rejected under 35 U.S.C. 103(a) as being unpatentable over Onomichi et al (US 2001/0005278) in view of Ito et al (US 6,699,580).

With respect to claims 1, 2, 4, and 13, Onomichi et al discloses an infrared absorption filter that has a maximum value of transmittance in the near IR region of 800 nm to 1100 nm (paragraph [0196]) that comprises:

- an infrared coloring matter such as an diimmonium compound as shown in formula (1)



that has a large absorption in the near-infrared region (paragraph [0068]);

- a polymer resin that is coated on a transparent substrate film (paragraph [0184]); and
- a nonionic or anionic surfactant (paragraph [0162]).

Further, Onomichi et al discloses a process of preparing a filter in which the resin, infrared absorption coloring matter (diimonium compound), solvent, and surfactant is coated and dried to obtain a filter (paragraph [0233]). However, Onomichi et al, fail to disclose the use of a silicone or fluorine type surfactant with an HLB of 2 to 12.

Ito et al discloses a dispersion composition for use in a plasma display that comprises a polysiloxane surfactant with a HLB value of 3 to 18. When the value is less than 3, improvement effect of the coating property of the dispersion liquid can not be obtained. When the value exceeds 18, foaming occurs causing non-uniform mixing within the coated layer and image. Therefore, it would have been obvious to one of ordinary skill within the art at the time of the invention to use a surfactant with a HLB between 3 and 18 as disclosed by Ito et al within the infrared absorption filter of Onomichi et al. to improve coating property to the glass panel.

3. Claims 3 and 9 are rejected under 35 U.S.C. 103(a) as being unpatentable over Onomichi et al (US 2001/0005278) in view of Ito et al (US 6,699,580) as applied to claim 1 and in view of Kuwabara (US 2002/375766).

With respect to claim 3, Onomichi et al in view of Ito et al discloses the film as supplied to claim 1 above, but fails to disclose a dye within the near-infrared ray absorption layer that have a maximum absorption between 550 nm and 620 nm in wavelength.

Kuwabara disclose a similar near infrared absorption material that comprises a near-infrared absorbing dye (such as a diimmonium dye – paragraph [0035]), a transparent resin [0032] on a transparent substrate (paragraph [0027] wherein the near-infrared absorption material contains a dye selectively absorbing light between the wavelengths of 550 and 620 nm (paragraph [0032] and [0050]). The addition of the dye that absorbs at wavelengths between 550 and 620 nm will proved clear images and increase durability and weather resistance (paragraph [0009]).

It would be obvious to one of ordinary skill in the art to include dye that absorbs at wavelengths between 550 and 620 nm disclosed in the near infrared absorption material of Kuwabara to the transparent substrate film of Onomichi et al in view of Ito et al to further enhance the clarity of images and increase durability and weather resistance (paragraph [0009]).

With respect to claim 9, it is the examiner's position the near infrared film comprising said dye has a light transmittance between 550 and 600 nm between 40 and

60% and a light transmittance no higher than 20% between 800 and 1100 nm (paragraph [0061] and figure 1) as taught by Kuwabara.

4. Claim 5 is rejected under 35 U.S.C. 103(a) as being unpatentable over Onomichi et al (US 2001/0005278) in view of Ito et al (US 6,699,580) as applied to claim 1 and in further view of Sato et al. (Japanese Patent Application 2004-202899).

With respect to claim 5, Onomichi et al in view of Ito et al discloses the film as supplied to claim 1 above, but fails to disclose a transparent substrate film made of a laminated film made of at least three layers or more or an ultraviolet layer.

Sato et al. discloses a similar transparent, laminating polyester film that contains that is made of three layers (paragraph [0008]), and an ultraviolet ray absorbent (paragraph [0014]) is provided within the inner layer (paragraphs [0008] and [0013]). The laminated film will have the capacity to cut-off ultraviolet rays so that decomposition can't take place during film production (paragraph [0004]).

It would be obvious to one of ordinary skill in the art to use the transparent film of Sato et al. in place of the transparent substrate film of Onomichi et al in view of Ito et al. to further enhance the capacity to cut-off ultraviolet rays in order to prevent the decomposition of the film during its production.

5. Claims 6 and 7 are rejected under 35 U.S.C. 103(a) as being unpatentable over Onomichi et al (US 2001/0005278) in view of Ito et al (US 6,699,580) as applied to claim 1 and in further view of Taki et al. (US 6,703,138).

With respect to claims 6 and 7, Onomichi et al in view of Ito et al discloses the film as supplied to claim 1 above as well as an resin intermediate layer between the image forming a layer and substrate (paragraph [0195]), but fails to disclose the type of resin and acid value of that resin.

Taki et al. discloses an adhesive laminated film that includes a acrylic resin with acid value of at least 200 eq./t along with polyester resins, or a copolymer (including block and graft copolymers – column 4, lines 60-61) of two or more of these resins and contains at least one monomer that comprises an acid anhydride containing a double bond (column 5, lines 22-29). If the acid value is lower than 200 eq./t, the acrylic resin is not sufficiently water soluble or water-dispersable causing polar groups to remain unchanged therefore lowering the water resistance of the coating layer (column 5,lines 5-14). Further, the use of graft polymers has been proposed to improve the adhesion of polyester films (column 1, lines 31-38). It would be obvious to one of ordinary skill in the art to include adhesive layer of Taki et al. in place of intermediate layer of the image forming material of Onomichi et al in view of Ito et al. to further enhance water resistance and the adhesion of the coating layer.

6. Claim 8 is rejected under 35 U.S.C. 103(a) as being unpatentable over Onomichi et al (US 2001/0005278) in view of Ito et al (US 6,699,580) as applied to claim 1 and in further view of Oya (US 2003/0186040).

With respect to claim 8, Onomichi et al in view of Ito et al discloses the film as supplied to claim 1 above, but fails to disclose the light transmission of the near-infrared absorption film.

Oya discloses a similar near-infrared ray film that comprises a near-infrared light absorber (paragraph [0038]), glass substrate (paragraph [0170)], a resin (paragraph [0044]), and surfactant (paragraph [0145]) wherein the film has a total transmittance of 60% or more between the wavelengths of 400 to 650 nm (paragraph [0034]) and transmittances at 850 nm and 950 nm to 20% or less (paragraphs [0027] and [0036]). When total transmittance is lower than 60% of wavelengths between 400 to 600 nm, the entire image becomes dark and power consumption for achieving brightness increases (paragraph [0034]). When the transmittances for near infrared rays having wavelengths of 850 nm and 950 nm are higher than 20%, near infrared rays radiated from the plasma display may not be shielded completely, whereby the peripheral equipment of the plasma display may malfunction (paragraph [0027]).

It would be obvious to on of ordinary skill in the art to use a film having the light transmittance properties of the near-infrared film of Oya in the near-infrared film of Onomichi et al in view of Ito et al to prevent the production of dark images and possible malfunction of the peripheral equipment of the plasma display.

7. Claims 10 and 24 are rejected under 35 U.S.C. 103(a) as being unpatentable over Onomichi et al (US 2001/0005278) in view of Ito et al (US 6,699,580) as applied to claim 1 and in further view of Moriwaki et al (US 2003/0021935).

With respect to claim 10, Onomichi et al in view of Ito et al. discloses the film as supplied to claim 1 above, but fails to disclose an anti-reflective layer.

Moriwaki et al discloses a laminated film that comprises a resin [0049], colorant [0046] and [0047] layer provided on a substrate film [0060] wherein an antireflection layer is formed on one side of the substrate and where the colored adhesive (colorant layer) is formed on the other side of the substrate [0060]. The laminated film has the colorant layer formed on the opposite side to the antireflective layer (paragraph [0061]). Further, the laminated film is used so that the antireflection layer is on the observer side, and the colorant layer (or the colored adhesive layer) is on the display device (such as cathode ray tube) side (paragraph [0061]). The use of an antireflective layer can prevent reflection on the surface of the panel glass and make the brightness of an image more uniform regarding production of CRT (paragraph [0007]).

It would have been obvious to one of ordinary skill in the art at the time of the invention to use an antireflective layer as disclosed by Moriwaki et al. within the film of Onomichi et al in view of Ito et al. to prevent the reflection of the surface of the panel glass of a CRT display and provide a more uniform image.

8. Claims 11 and 12 are rejected under 35 U.S.C. 103(a) as being unpatentable Onomichi et al (US 2001/0005278) in view of Ito et al (US 6,699,580) as applied to claim 1 and in further view of Kumano et al (JP 2003-127310)

With respect to claims 11 and 12, Onomichi et al in view of Ito et al discloses the film as applied to claim 1 above, but fails to disclose a near-infrared film roll.

Kumano et al. discloses the process for preparing a cavity-containing polyester-based film roll in which the total color difference (E) in the film roll is 1.0 (paragraph [0020]) or less and wherein the color difference is a measurement incorporating the average color tone value, L (paragraph 0020). If the color difference is too large, than the color tome fluctuation within the lot of a film roll will become large therefore spoiling the design nature of the patterned printing layer and the stability of the film (paragraph [0020]). To make the color difference smaller, it is important to decrease the segregation of the material inside to receive proper distribution of the color pigment (paragraph [0021]). It is the examiner's position that the color difference can be obtained using any said length or width because stretching and widening film can be performed to obtain any desired color difference. Also, color tone is also dependent upon the amount of color pigment within the film that will also affect the color difference.

It would have been obvious to one of ordinary skill within the art at the time of the invention to provide a film roll comprising the image forming material of Onomichi et al in view of Ito et al and having a color difference of 1.0 or lower by measuring the color tone of the film as taught by Kumano et al. to preserve the design nature of the patterned printing layer and the stability of the film.

9. Claim 14 is rejected under 35 U.S.C. 103(a) as being unpatentable over Onomichi et al (US 2001/0005278) in view of Ito et al (US 6,699,580) as applied to claim 13 above and further in view of Kubo. (US 6,770,430).

With respect to claim 14, Onomichi et al in view of Ito et al discloses the film (image forming material) as applied to claim 13 above, but fails to disclose a multi-stage drying after coating a film on a substrate.

Kubo discloses a thermally processed image forming material wherein a coating of material is applied to a substrate and dried with from 25 to 40 degrees C for (at a constant drying rate) and then heated again to 80 degrees C (paragraph [0204]). For preventing uneven processing due to dimensional changes, it is preferred to heat the material the material at 80-115 degrees C for 5 seconds then heating the material from 110 to 140 degree to produce the image (multi-stage heating) (column 29, lines 35-39).

It would have been obvious to on of ordinary skill within the art at the time of the invention to apply a multi-stage heating process as disclosed by Kubo et al. to the image forming material of Onomichi et al in view of Ito et al to prevent uneven processing in the production of an image.

10. Claims 15 and 16 are rejected under 35 U.S.C. 103(a) as being unpatentable over Onomichi et al (US 2001/0005278) in view of Ito et al (US 6,699,580) as applied to claim 13 above and further in view of Ogawa et al. (US 2004/0071883).

With respect to claims 15 and 16, Onomichi et al in view of Ito et al discloses the film (image forming material) as applied to claim 13 above, but fails to disclose the use of reverse gravure method in applying forming material.

Ogawa et al discloses a method and apparatus for coating a thin film comprising a reverse gravure coating type roll (paragraph [0033] and Figure 1) wherein the

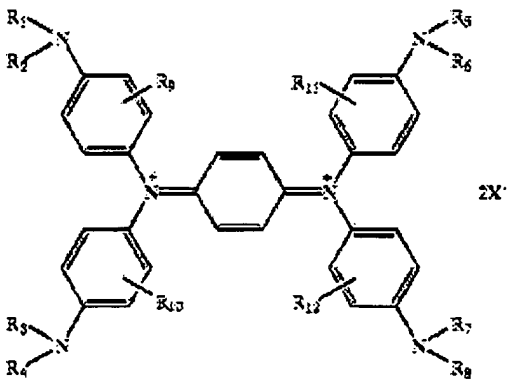
diameter of the gravure roll (1) in Figure 1 not smaller than 15mm (paragraph [0091]). In the case that the diameter of the gravure roll falls below 15 mm, when the doctor blade (3) is pressed against the gravure roll (1), the roll is bent so much causing unevenness of coating due to the rotation of the roll (paragraph [0091]).

It would have been obvious to one of ordinary skill in the art at the time of the invention to use reverse gravure method with a diameter of 15 mm or more as disclosed within Ogawa et al. in applying the image forming material Onomichi et al in view of Ito et al. to prevent unevenness of the coating to a substrate.

11. Claim 17 is rejected under 35 U.S.C. 103(a) as being unpatentable over Onomichi et al (US 2001/0005278) in view of Ito et al (US 6,699,580) and in further view of Kumano et al (Japanese Patent 2003-127310).

With respect to claim 17, Onomichi et al in view of Ito et al discloses an image forming material comprising:

- an infrared coloring matter such as an diimmonium compound as shown in formula (1)



that has a large absorption in the near-infrared region (paragraph [0068]);

- a polymer resin that is coated on a transparent substrate film (paragraph [0184]); and
- a nonionic or anionic surfactant (paragraph [0162]).

Further, Onomichi et al discloses a process of preparing a filter in which the resin, infrared absorption coloring matter (diimmonium compound), solvent, and surfactant is coated and dried to obtain a filter (paragraph [0233]). However, Onomichi et al, fail to disclose the use of a silicone or fluorine type surfactant with an HLB of 2 to 12.

Ito et al discloses a dispersion composition for use in a plasma display that comprises a polysiloxane surfactant with a HLB value of 3 to 18. When the value is less than 3, improvement effect of the coating property of the dispersion liquid can not be obtained. When the value exceeds 18, foaming occur, causing non-uniform mixing within the coated layer and image. Therefore, it would have been obvious to one of ordinary skill within the art at the time of the invention to use a surfactant with a HLB between 3 and 18 as disclosed by Ito et al within the infrared absorption filter of Onomichi et al. to improve coating property to the glass panel.

However, Onomichi et al in view of Ito et al but fail to disclose a process for preparing a film roll that has a maximum color difference of 1.0 or smaller.

Kumano et al. discloses the process for preparing a cavity-containing polyester-based film roll in which the total color difference (E) in the film roll is 1.0 (paragraph [0020]) or less and wherein the color difference is a measurement incorporating the average color tone value, L (paragraph 0020). If the color difference is too large, than the color tome fluctuation within the lot of a film roll will become large therefore spoiling the design nature of the patterned printing layer and the stability of the film (paragraph [0020]). To make the color difference smaller, it is important to decrease the segregation of the material inside to receive proper distribution of the color pigment (paragraph [0021]). It is the examiner's position that the color difference can be obtained using any said length or width because stretching and widening film can be performed to obtain any desired color difference. Also, color tone is also dependent upon the amount of color pigment within the film that will also affect the color difference.

It would have been obvious to one of ordinary skill within the art at the time of the invention to prepare a film roll comprising the image forming material of Onomichi et al in view of Ito et al. wherein the film has a color difference of 1.0 or lower by measuring the color tone of the film as taught by Kumano et al. to preserve the design nature of the patterned printing layer and the stability of the film.

12. Claim 18 is rejected under 35 U.S.C. 103(a) as being unpatentable over Onomichi et al (US 2001/0005278) in view of Ito et al (US 6,699,580) and in view of Kumano (Japanese Patent 2003-127310) as applied to claim 17 above and further in view of Iwasaki et al (US 4,948,635).

With respect to claim 18, Onomichi et al in view of Ito et al. discloses the film as applied to claim 1 above along with drying of the film (paragraph [0219]) but fails to disclose the use of a gravure apparatus in applying coating solution.

Iwasaki et al. discloses a gravure coating device and method wherein the velocity of the gravure roll and of the web affects the thickness of the application of the coating agent (column 12, lines 30-35 and FIG. 9). As the velocity increase, the thickness of the coating agent will increase (See FIG. 9). Iwasaki also teaches that in prior art that wrinkles are produced on the surface side of the web (film) when the web is thin (column 2, lines 5-10) from the clamping force of the rolls (column 2, lines 5-10). It is the position of the examiner that one would adjust the rotational rate and running rate of the film by increasing the thickness of the film in order achieve smoothness and prevent wrinkles from occurring in the film.

Therefore, it would have been obvious to one of ordinary skill in the art at the time of the invention to use a gravure coating apparatus as disclosed by Iwasaki et al. in applying the film of modified Onomichi et al in view of Ito et al. to prevent wrinkling of the film on its surface side as well as to increase film thickness to achieve smoothness in film.

13. Claim 19 is rejected under 35 U.S.C. 103(a) as being unpatentable over Onomichi et al (US 2001/0005278) in view of Ito et al (US 6,699,580) and in view of Kumano (Japanese Patent 2003-127310) as applied to claim 17 above, and further in view of Ogawa et al (US 2004/0071883).

With respect to claim 19, Onomichi et al in view of Ito et al discloses the film as applied to claim 17 above along with drying of the film (paragraph [0219]) however, modified Onomichi et al in view of Ito et al. fails to disclose the use of a gravure coating apparatus in preparing a film roll.

Ogawa et al discloses a method and apparatus for coating a thin film comprising a reverse gravure coating type roll (paragraph [0033] and Figure 1) wherein apparatus (100) has a gravure roll (1) is made of ceramic (paragraph [0098]) and a doctor blade (3) that is capable of scrapping off the excess coating solution (paragraph [0099]) by coming in contact with the gravure roll (paragraph [0100]). The excess coating solution is recycled to the coating solution supply (61) by the coating solution recovery portion 73 (paragraph [0057]). In the case that the diameter of the gravure roll is too low, when the doctor blade (3) is pressed against the gravure roll (1), the roll is bent so much causing unevenness of coating due to the rotation of the roll (paragraph [0091]).

It would have been obvious to one of ordinary skill in the art at the time of the invention to use a reverse gravure method with a diameter of 15 mm or more as disclosed within Ogawa et al. in applying the image forming material Onomichi et al in view of Ito et al. to prevent unevenness of the coating.

14. Claims 20 –21 are rejected under 35 U.S.C. 103(a) as being unpatentable over Onomichi et al (US 2001/0005278) in view of Ito et al (US 6,699,580) in further view of Iwasaki et al (US 4,948,635).

With respect to claim 20 and 21, Onomichi et al in view of Ito et al discloses the film as applied to claims 1 and 13 above, however, Onomichi et al in view of Ito et al. fails to discloses the use of a gravure coating apparatus and method of in preparing a film roll.

Iwasaki et al. discloses a gravure coating device and method wherein the velocity of the gravure roll and of the web affects the thickness of the application of the coating agent (column 12, lines 30-35 and FIG. 9). As the velocity increase, the thickness of the coating agent will increase (FIG. 9). Iwasaki also teaches that in prior art that wrinkles are produced on the surface side of the web (film) when the web is thin (column 2, lines 5-10) from the clamping force of the rolls (column 2, lines 5-10). It is the position of the examiner that one would adjust the rotational rate and running rate of the film by increasing the thickness of the film in order achieve smoothness and prevent wrinkles from occurring in the film.

Therefore, it would have been obvious to one of ordinary skill in the art at the time of the invention to use a gravure coating apparatus as disclosed by Iwasaki et al. in applying the film of Onomichi et al in view of Ito et al. to prevent wrinkling of the film on its surface side as well as to increase film thickness to achieve smoothness in film.

15. Claim 22 is rejected under 35 U.S.C. 103(a) as being unpatentable over Onomichi et al (US 2001/0005278) in view of Ito et al (US 6,699,580) and in view of Iwasaki et al. (US 4,948,635) as applied to claim 20 above, and further in view of Ogawa et al (US 2004/0071883).

With respect to claim 22, Onomichi et al in view of Ito et al. discloses the process for preparing a near infrared film as applied to claim 20 above along with drying of the film (paragraph [0219]) however, Onomichi et al in view of Ito et al. fails to disclose the use of a gravure coating apparatus in preparing a film roll.

Ogawa et al discloses a method and apparatus for coating a thin film comprising a reverse gravure coating type roll (paragraph [0033] and Figure 1) wherein apparatus (100) has a gravure roll (1) is made of ceramic (paragraph [0098]) and a doctor blade (3) that is capable of scrapping off the excess coating solution (paragraph [0099]) by coming in contact with the gravure roll (paragraph [0100]). The excess coating solution is recycled to the coating solution supply (61) by the coating solution recovery portion 73 (paragraph [0057]). In the case that the diameter of the gravure roll is too low, when the doctor blade (3) is pressed against the gravure roll (1), the roll is bent so much causing unevenness of coating due to the rotation of the roll (paragraph [0091]).

It would have been obvious to one of ordinary skill in the art at the time of the invention to use a reverse gravure method with a diameter of 15 mm or more as disclosed within Ogawa et al. in applying the image forming material of Onomichi et al in view of Ito et al. to prevent unevenness of the coating.

16. Claim 23 is rejected under 35 U.S.C. 103(a) as being unpatentable over Onomichi et al (US 2001/0005278) in view of Ito et al (US 6,699,580) and in view of Iwasaki et al. (US 4,948,635) as applied to claim 20 above, and further in view of Kubo (US 6,770,430).

With respect to claim 23 Onomichi et al in view of Ito et al. discloses the process for preparing a near infrared film as applied to claim 20 above along with drying of the film (paragraph [0219]) however, Onomichi et al in view of Ito et al. fails to disclose a multi-stage drying process after coating a film on a substrate.

Kubo discloses a thermally processed image forming material wherein a coating of material is applied to a substrate and dried with from 25 to 40 degrees C for (at a constant drying rate) and then heated again to 80 degrees C (paragraph [0204]). For preventing uneven processing due to dimensional changes, it is preferred to heat the material the material at 80-115 degrees C for 5 seconds then heating the material from 110 to 140 degree to produce the image (multi-stage heating) (column 29, lines 35-39).

It would have been obvious to on of ordinary skill within the art at the time of the invention to apply a multi-stage heating process as disclosed by Kubo et al. to the image forming material of Onomichi et al in view of Ito et al. to prevent uneven processing in the production of an image.

Response to Arguments

17. Applicant's arguments, see Claim Rejection Under 35 U.S.C. 102 – page 2, filed September 27, 2007, with respect to the rejection(s) of claim(s) 1,2,4, and 13 under 35 U.S.C.102(b) have been fully considered and are persuasive. Therefore, the rejection has been withdrawn. However, upon further consideration, a new ground(s) of rejection is made in view of Onomichi et al (US 2001/0005278) in view of Ito et al (US 6,699,580) (35 U.S.C. 103(a)).

Conclusion

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Ponder N. Thompson-Rummel whose telephone number is 571-272-9816. The examiner can normally be reached on Monday-Friday 7:00 am - 4:30 pm EST.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Alexa Neckel can be reached on 571-272-1446. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

PTR

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